Amendment To The Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (currently amended): A method for electrofilling a metal or alloy inside at least one opening surrounded by a field ~~located in~~ on a front surface of a substrate, ~~said front surface of the substrate comprises the at least one opening and a top field surrounding the at least one opening, said at least one opening comprises a bottom and sidewalls surfaces wherein at least the bottom surface comprises an exposed metallic surface~~ wherein at least one surface inside the at least one opening comprises an exposed metallic surface, said method ~~includes~~ comprising steps of:

(a) immersing the substrate in an activation or wetting solution;

(b) applying ultrasonic or megasonic vibrations to the substrate ~~and to the activation or wetting solution~~; and

after commencing ~~ultrasonic or megasonic vibrations~~ step (b):

(c) applying high pressure jets of an electrolyte to the substrate, said electrolyte comprises metallic ions of said metal or alloy; and

(d) applying an electroplating current to the substrate to electroplate said metal or alloy inside the at least one opening;

wherein the activation or wetting solution is the same as the electrolyte, and wherein steps (a), (b), (c), and (d) are performed in the same chamber.

2. (currently amended): The method of claim 1 wherein the electrolyte ~~further~~ comprises at least one inhibitor additive.

3. (currently amended): The method of claim ~~2~~ 1 wherein the ~~activation or wetting solution is different than the electrolyte~~ at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising a non-metallic surface.

4. (currently amended): The method of claim ~~2~~ 1 wherein the ~~activation or wetting solution is the same as the electrolyte~~ at least one opening has a sidewall surface comprising an exposed metallic surface.

5. (currently amended): The method of claim ~~4~~ 1 wherein the ~~steps of immersing the substrate in an activation (or wetting) solution, applying ultrasonic or megasonic vibrations to the substrate, applying high pressure jets of an electrolyte to the substrate, and applying an electroplating current to the substrate, are performed in the same chamber~~ at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising an exposed metallic surface.

6. (currently amended): The method of claim ~~5~~ 1 wherein ~~the step of applying ultrasonic or megasonic vibrations to the substrate is extended to coincide with at least a portion of the steps of applying high pressure jets of an electrolyte to the substrate, and applying an electroplating current to the substrate~~ step (b) is continued during at least a portion of steps (c) and (d).

7. (currently amended): ~~A method for electroplating a metal or alloy inside at least one opening surrounded by a field on a substrate, said at least one opening comprising sidewalls surfaces, wherein at least the field and the sidewalls surfaces comprise an exposed metallic surface, and the method comprising the steps of:~~

~~(a) immersing the substrate in an activation or wetting solution;~~

~~(b) applying ultrasonic or megasonic vibrations to the substrate and to the activation or wetting solution; and~~

~~after commencing step (b):~~

~~(c) applying high pressure jets of an electrolyte to the substrate, said electrolyte comprising metallic ions of said metal or alloy and at least one inhibitor additive; and~~

~~(d) applying an electroplating current to the substrate to electroplate said metal or alloy inside the at least one opening~~ The method of claim 2 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising a non-metallic surface.

8. (currently amended): The method of claim ~~7~~ 2 wherein the ~~activation or wetting solution is different than the electrolyte~~ at least one opening has a sidewall surface comprising an exposed metallic surface.

9. (currently amended): The method of claim ~~7~~ 2 wherein the ~~activation or wetting solution is the same as the electrolyte~~ at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising an exposed metallic surface.

10. (currently amended): The method of claim ~~7~~ 2 wherein ~~steps (a) and (b) are performed in one chamber, and steps (c) and (d) are performed in another chamber~~ step (b) is continued during at least a portion of steps (c) and (d).

11. Cancelled.

12. Cancelled.

21. Cancelled.

22. Cancelled.

23. Cancelled.

24. Cancelled.

25. Cancelled.

26. Cancelled.

27. Cancelled.

28. Cancelled.

29. (New): A method for electroplating a metal or alloy inside at least one opening surrounded by a field on a front surface of a substrate, wherein at least one surface inside the at least one opening comprises an exposed metallic surface, said method comprising steps of:

(a) immersing the substrate in an electrolyte contained in an electroplating chamber, said electrolyte comprising metallic ions of said metal or alloy;

(b) applying ultrasonic or megasonic vibrations to the substrate; and

after commencing step (b):

(c) producing turbulent flow of the electrolyte at a surface of the substrate; and

(d) applying an electroplating current to the substrate to electroplate said metal or alloy inside the at least one opening;

wherein steps (a), (b), (c), and (d) are performed in the electroplating chamber.

30. (New): The method of claim 29 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising a non-metallic surface.

31. (New): The method of claim 29 wherein the at least one opening has a sidewall surface comprising an exposed metallic surface.

32. (New): The method of claim 29 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising an exposed metallic surface.

33. (New): The method of claim 29 wherein step (b) is continued during at least a portion of steps (c) and (d).

34. (New): The method of claim 29 wherein the electrolyte comprises at least one inhibitor additive.

35. (New): The method of claim 34 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising a non-metallic surface.

36. (New): The method of claim 34 wherein the at least one opening has a sidewall surface comprising an exposed metallic surface.

37. (New): The method of claim 34 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising an exposed metallic surface.

38. (New): The method of claim 34 wherein step (b) is continued during at least a portion of steps (c) and (d).

39. (New): A method for electroplating a metal or alloy inside at least one opening surrounded by a field on a front surface of a substrate, wherein at least one surface inside the at least one opening comprises an exposed metallic surface, said method comprising steps of:

(a) immersing the substrate in an electrolyte contained in an electroplating chamber, said electrolyte comprising metallic ions of said metal or alloy and at least one inhibitor additive;

(b) applying ultrasonic or megasonic vibrations to the substrate; and

after commencing step (b):

(c) agitating the electrolyte across the front surface of the substrate; and

(d) applying an electroplating current to the substrate to electroplate said metal or alloy inside the at least one opening;

wherein inside surfaces of the at least one opening are wetted by utilizing steps (a) and (b) alone.

40. (New): The method of claim 39 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising a non-metallic surface.

41. (New): The method of claim 39 wherein the at least one opening has a sidewall surface comprising an exposed metallic surface.

42. (New): The method of claim 39 wherein the at least one opening has a bottom surface comprising an exposed metallic surface, and a sidewall surface comprising an exposed metallic surface.

43. (New): The method of claim 39 wherein step (b) is continued during at least a portion of steps (c) and (d).